PREFACE

This manual provides some of the more common critical weather (and environmental) effects data and applies that information to specific operations, systems, and personnel. Inclement weather degrades battlefield operations, affects weapons and other systems, and plays a major role in the effectiveness of troops in the field.

This data is intended to support the brigade and battalion S2 and staff. It is applicable to combat, combat service, and combat service support units and is intended for use by Active Component (AC), Reserve Components (RC), and Army National Guard (ARNG) units in both training and combat situations.

Use of these lookup tables and data is a three-step process. For additional information on how this is accomplished, see Appendix A. The three steps are-

- Using current weather observations and forecasted conditions, you look for weather extremes. That is, those conditions that will be too hot, too cold, too windy, too overcast, too wet, or too humid for normal operations.
- Turning to the lookup tables, you then identify specific operations, systems, and personnel that will be impacted.
- And finally, bringing any impacts and constraints you have identified to the attention of your commander and the rest of the staff.

The critical values presented here, together with current weather observations or future forecasts mentioned above, will provide you with the basic tools needed to perform these three steps. Data are presented in the form of simple lookup tables called weather tactical decision aids (WTDAs). These WTDAs are designed to point you toward your briefing of the commander and staff. Appendixes B through O are tailored toward specific types of units.

This manual does not make you an expert in all facets of weather and the total impact that inclement weather might have on an army in the field. Instead, it allows you to quickly understand the potential impact specific current and forecasted weather elements could have on your unit's plans today.

Not all weather and environmental data parameters impacting Army systems and operations are addressed. A listing of the weather and data parameters

FM 34-81-1

currently identified as impacting Army operations, systems, or personnel is at Appendix O.

If you determine that a weather element may have a severe or moderate impact on operations, systems, or personnel (friendly or threat), you alert the commander and staff to this potential impact. This allows your commander to-

- Request additional information.
- Modify his plans.
- Continue as originally planned, but aware of potential weather problems.

The proponent of this publication is the United States Army Intelligence Center and Fort Huachuca (USAIC&FH). USAIC&FH is the proponent for Army weather minus Field Artillery. Send comments and recommendations on DA Form 2028 (Recommended Changes to Publications and Blank Forms) directly to Commander, US Army Intelligence Center and Fort Huachuca, ATTN: ATZS-TDL-D, Huachuca, AZ 85613-6000.

This manual does not implement any International Standardization Agreements.

Unless this publication states otherwise, masculine nouns and pronouns do not refer exclusively to men.